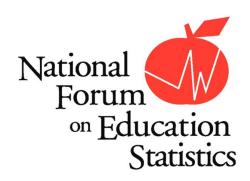
# Forum Guide to Elementary/Secondary Virtual Education Data

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### Presentation Outline

- National Forum on Education Statistics
- Forum Guide to Elementary/Secondary Virtual Education Data
- Practitioner Perspectives on Virtual Education
- Q&A

### National Forum on Education Statistics

**Mission:** To plan, recommend, and develop education data resources that support local, state, and national efforts to improve public and private education throughout the United States.

#### Members:

- Representatives of offices of the U.S. Department of Education and other federal agencies
- Representatives of state and local education agencies (SEAs and LEAs)
- Associate members from U.S. territories, Regional Educational Laboratories (RELs), and national education associations

### Forum Resources

Forum resources are available online: <a href="http://nces.ed.gov/forum/">http://nces.ed.gov/forum/</a>

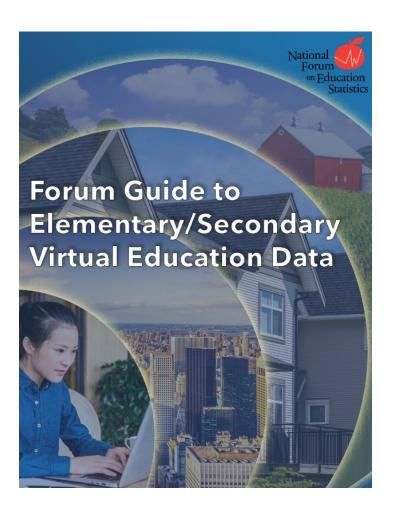
- Best-practice publications
- Online courses
- Videos
- Newsletters
- Outreach materials



### Forum Virtual Education Working Group

### Purpose of the working group

- Review the 2006 Forum publication
- Identify virtual education data collection challenges
- Explore data needs
- Develop a resource that offers best practices for building, modifying, and updating data systems to incorporate virtual education data



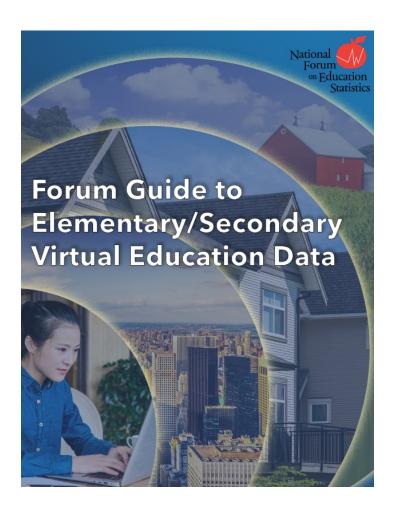
# Forum Guide to Elementary/Secondary Virtual Education Data

### Chapters

- 1. Virtual Education
- 2. Virtual Education Data
- 3. Virtual Education Data Use Policy Questions and Common Practices

#### **Appendices**

- A. Examples of SEA and LEA Policies
- B. SEA Virtual and Distance Learning Websites
- C. Suggested Elements for Virtual Education Data System

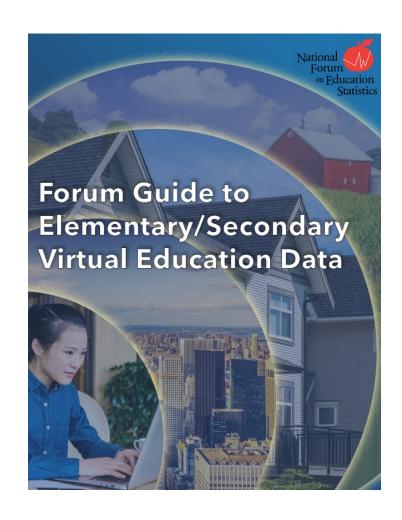


# Forum Guide to Elementary/Secondary Virtual Education Data

### Purpose of the document

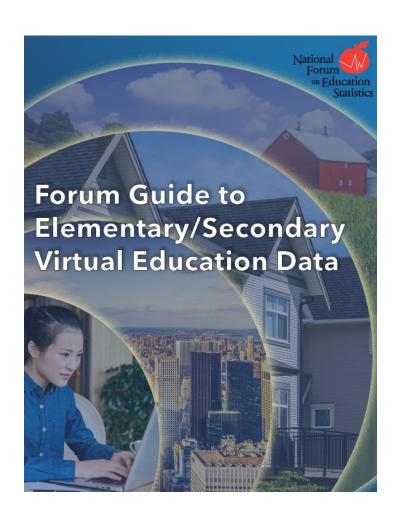
To assist SEAs and LEAs as they

- consider the impact of virtual education on established data elements and methods of data collection; and
- address the scope of changes, the rapid pace of new technology development, and the proliferation of resources in virtual education.



### Chapter 1: Virtual Education

- Examines the role of virtual education
- Reviews commonly used terms
- Discusses the importance of highquality data
- Identifies challenges and opportunities
- Suggests methods for modifying traditional data definitions



### What is Virtual Education?

There is no clear, uniform definition of "virtual education." It may include:

- Remote education
- Distance learning
- Online learning
- Distributed learning
- Home-based virtual instruction

- Open learning
- Networked learning
- Online learning
- Cyber education
- Blended learning
- Digital learning

- Computer-based learning
- Web-based education

### Virtual Education Definition

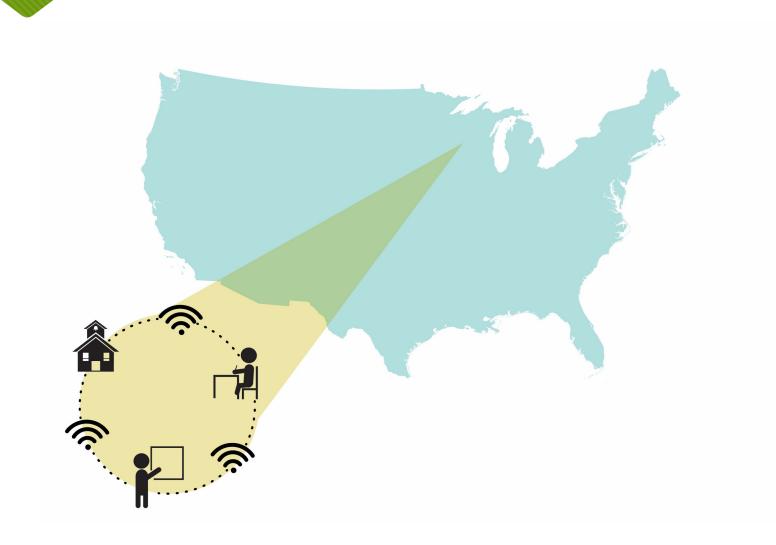
For our purposes, "virtual education" is defined as:

instruction during which students and teachers are separated by time and/or location and interact via internet-connected computers or other electronic devices.

# Developments in Education Technology and Virtual Education

- There is widespread use of education technology within many physical classroom settings.
- Online resources and access to technology devices have enabled the expansion of virtual education.
- Virtual education ranges from partially online coursework to 100% virtual programs and schools.
- Many schools are currently transitioning to virtual education to ensure learning continuity during extended school closures.

### Organizational Structure of Virtual Education



### Key Concepts and Terms

Pacing: The rate of advancement or progress through academic content.

- Synchronous Pacing
- Asynchronous Pacing
- Combined Synchronous/Asynchronous Pacing

Instructional techniques: Approaches to teaching and learning.

- Individualization
- Differentiation
- Personalization

### Virtual Education Data

**Existing data systems** that are capable of providing high-quality data for accountability and decisionmaking may not be able to accommodate virtual education data systems that are not aligned along traditional administrative, instructional, and policymaking channels.

# Challenges to Collecting High-Quality Virtual Education Data

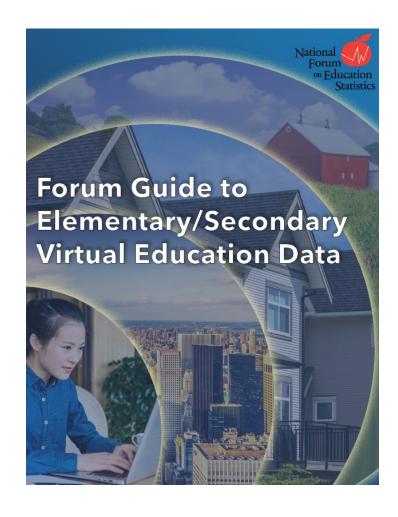
- Variation among SEAs and LEAs
- Data management and governance challenges
- Variations in data collection timelines
- Tracking student progress and pace
- Flexibility in grade levels and school assignments
- Capturing relevant virtual education data
- Distinguishing instructional time from homework
- Traditional concepts of course duration or structure
- Lack of high-quality data for evaluation
- Established structures/cultures
- Integrating virtual education data and other data systems

# Opportunities Available Through Virtual Education Data

- Easier implementation of tailored education
- Increased ability to award credit for subject mastery
- More precise information and new data on student learning
- Real-time feedback

### Chapter 2: Virtual Education Data

- Identifies three categories of data elements commonly used in virtual education data systems:
  - K-12 virtual and blended data elements
  - Organizational responsibility data elements
  - Data elements applicable to both traditional and virtual education credit and achievement



### K-12 Virtual and Blended Data Elements

Common elements that identify K-12 virtual and blended data include the following:

- Virtual Indicator
- Course Interaction Mode
- Blended Learning Model Type
- Course Section Instructional Delivery Mode

### Organizational Responsibility Data Elements

Data elements that help to clarify organizational responsibilities include the following:

- Responsible Organization Identifier
- Responsible Organization Type
- Responsible Organization Name
- Responsible District Identifier
- Responsible District Type
- Responsible School Identifier
- Responsible School Type

# Traditional and Virtual Course Credit and Achievement Data Elements

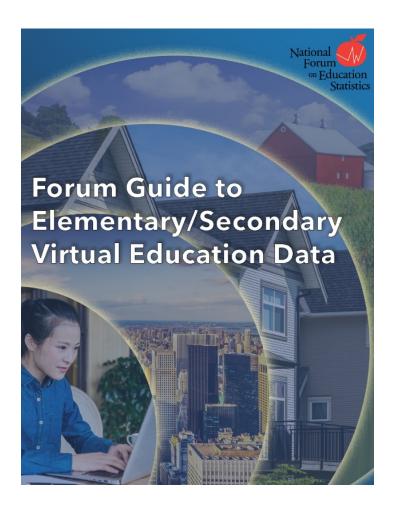
Data elements that help to accurately track both traditional and virtual education methods include the following:

- Course Credit Units
- Achievement Criteria
- Competency Set Completion Criteria
- Competency Set Completion Criteria Threshold
- Course Section Time Required for Completion

# Chapter 3: Virtual Education Data Use Policy Questions and Common Practices

#### **Provides**

- a list of topic areas for consideration;
- real world examples;
- policy questions;
- common best practices; and
- links to data elements.



### Topic Areas: Part I

#### School

- 1. School Identification/Classification
- 2. School Governance
- 3. School Accreditation
- 4. School Contact Information
- 5. School Location
- 6. School Enrollment
- 7. School Calendar

### Curriculum and Learning Environment

- 8. Course Information
- 9. Course Section Information
- 10. Unit Information, Learner Activities, and Resources
- 11. Content Governance and Accountability
- 12. Reporting Information
- 13. Safety and Discipline

### Topic Areas: Part II

#### **Students**

- 14. Student Information
- 15. Student Enrollment/Exit Information
- 16. Student Attendance Information
- 17. Student
  Participation/Performance
  Information
- 18. Student Progress Information
- 19. Student Disability Information

#### Staff

- 20. Staff Member Information
- 21. Staff Member Employment Status
- 22. Staff Member Employment Credentials
- 23. Staff Member Assignment Information
- 24. Staff Member Attendance Information

### **Topic Area 8: Course Information**

**Example:** A student took English I in 9th grade at a virtual school... Unfortunately, the virtual school curriculum was not aligned to state standards.

### **Policy Questions:**

- Does your curriculum framework or standard apply to virtual coursework?
- Do your organization's required content assessments apply to virtual coursework?
- Can students acquire exceptions to curriculum framework and assessment requirements (e.g., for transferred coursework)?
- Can you map transferred course information, including credits, to your organization's course classification system?

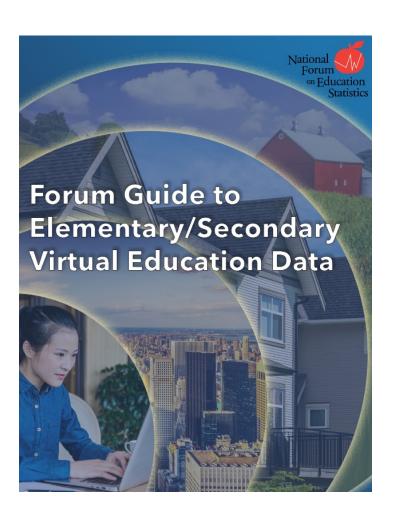
### **Topic Area 8: Course Information**

#### **Common Practices:**

- Course codes and coding systems need to be coordinated between institutions for transfer credit data to be meaningful.
- Organizations must be aware of differences in terminology and the effects on data when transferring information between organizations.
- School Courses for the Exchange of Data (SCED) is a voluntary, common classification system for prior-to-secondary and secondary school courses.

### **Appendices**

- Examples of SEA and LEA Policies
- SEA Virtual and Distance Learning Websites
- Suggested Elements for Virtual Education Data System



**Allen Miedema**, Northshore School District (WA)

Jay Pennington, lowa Department of Education

March – April School Closures

Continuous Learning Options

- Voluntary
- Required
- Combination

**Adrian L. Peoples**, Delaware Department of Education

LEAs given two weeks to develop remote learning plans.

Key decision points affecting plan:

- One-to-one device access
- Internet access (rural areas)
- Synchronous vs. asynchronous instruction delivery
- Synchronous vs.
   asynchronous office
   hours

**Dawn Gessel**, Putnam County Schools (WV)

**Dean Folkers**, Nebraska Department of Education

### Information and Resources

Forum Guide to Elementary/Secondary
Virtual Education Data
<a href="https://nces.ed.gov/forum/pub\_2016095.asp">https://nces.ed.gov/forum/pub\_2016095.asp</a>

For more information about the Forum, please visit https://nces.ed.gov/forum/index.asp

For more questions about Forum publications and resources, contact Ghedam Bairu at <a href="mailto:ghedam.bairu@ed.gov">ghedam.bairu@ed.gov</a>.

